

07807043

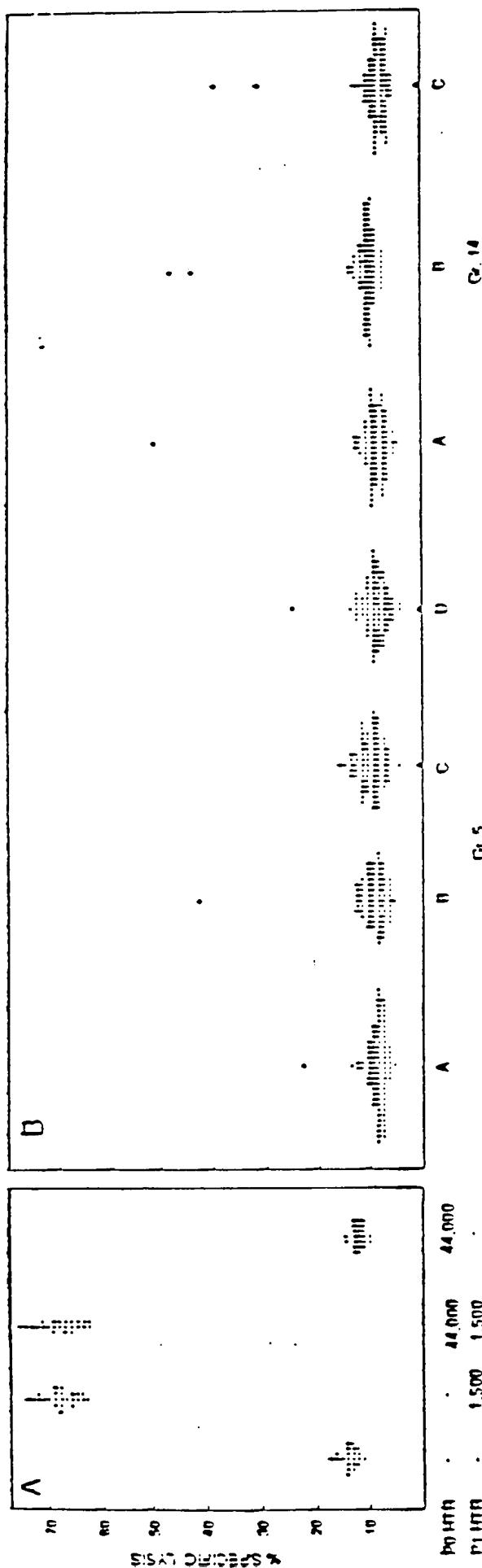


Figure 1

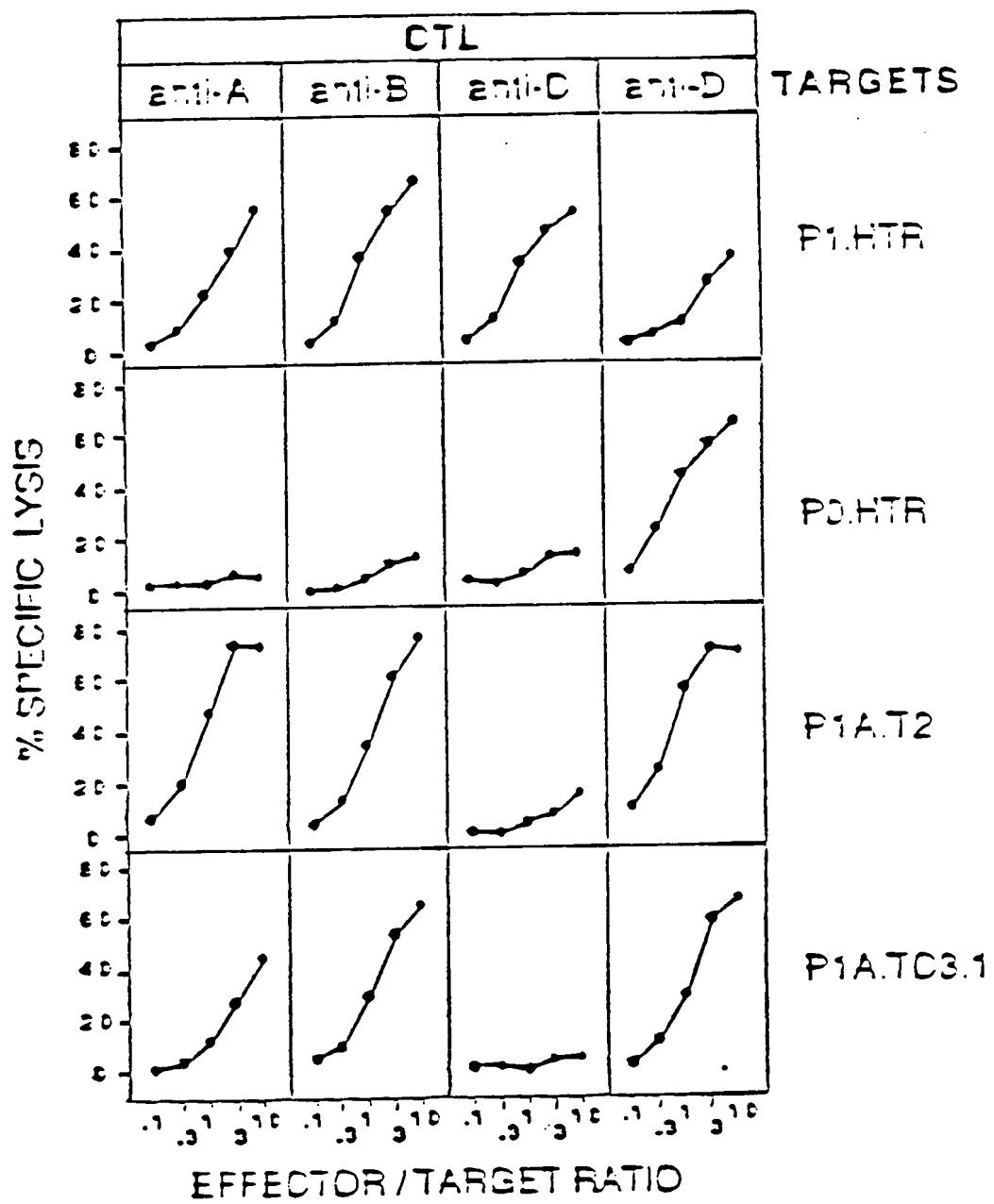
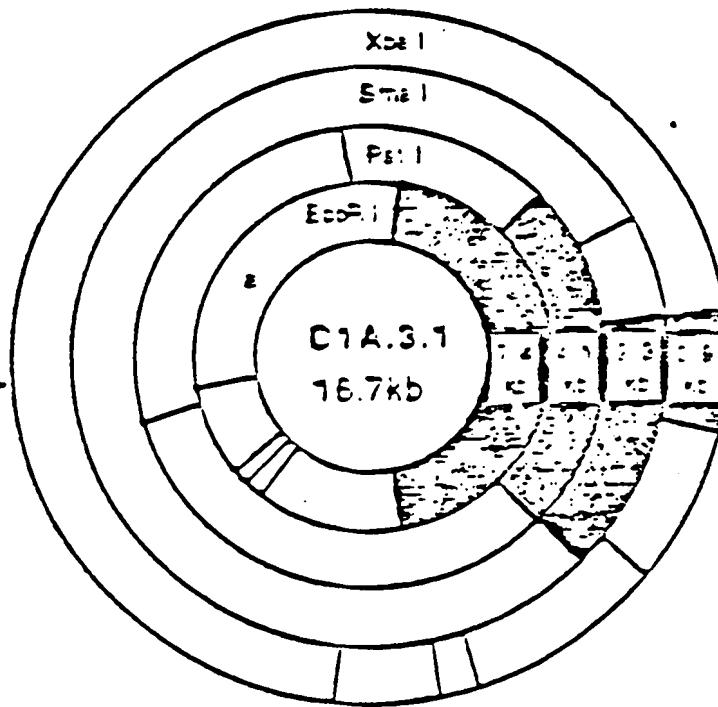


Figure 2

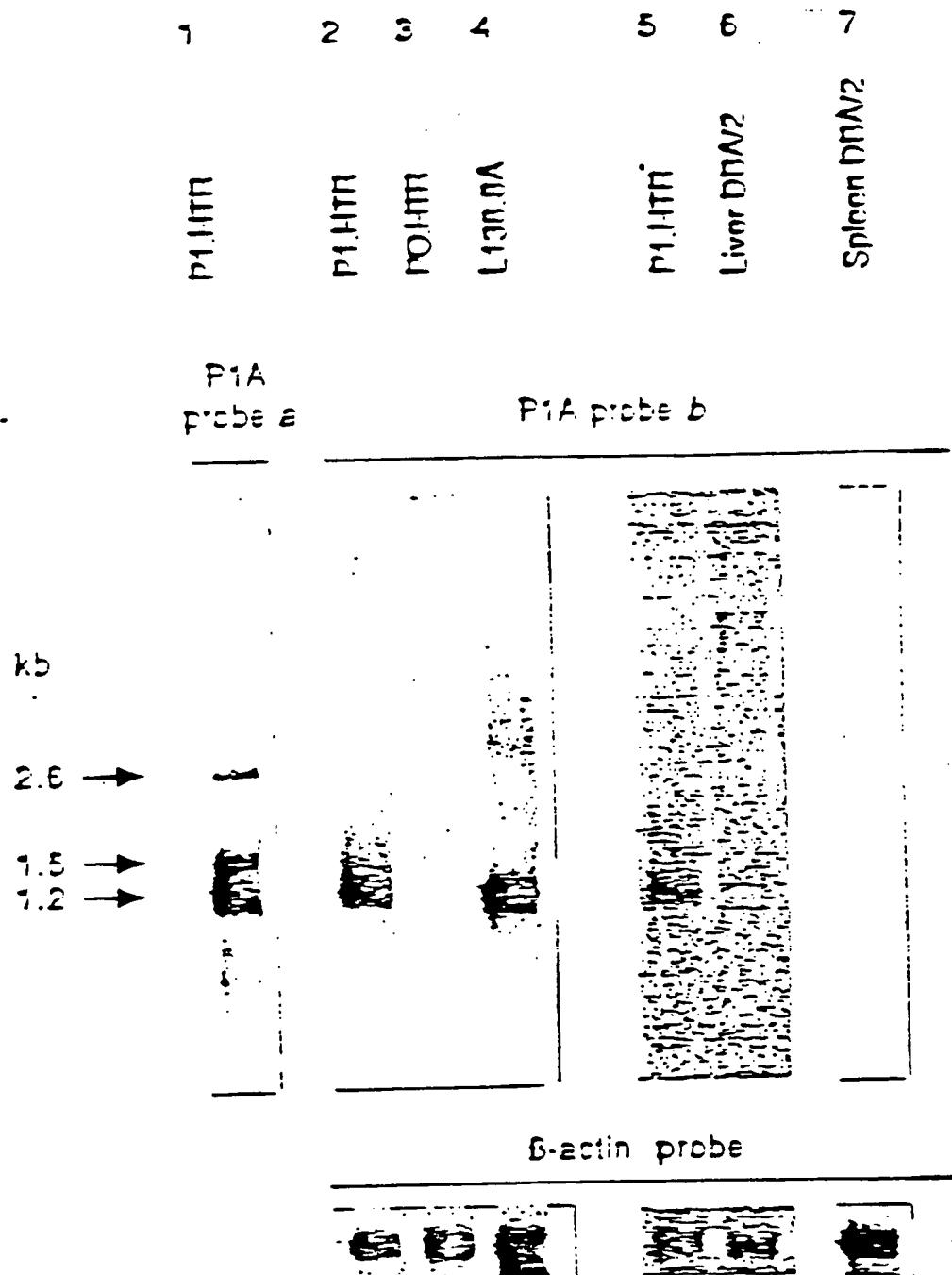


Transfection of restriction fragments

No. of clones expressing PE15A
/ no. of HmB^r clones

2.5 kb PstI + PstI	2/15
2.5 kb SmaI + PstI	1E/96
2.5 kb SmaI + XbaI	22/96

077807043



07/807043

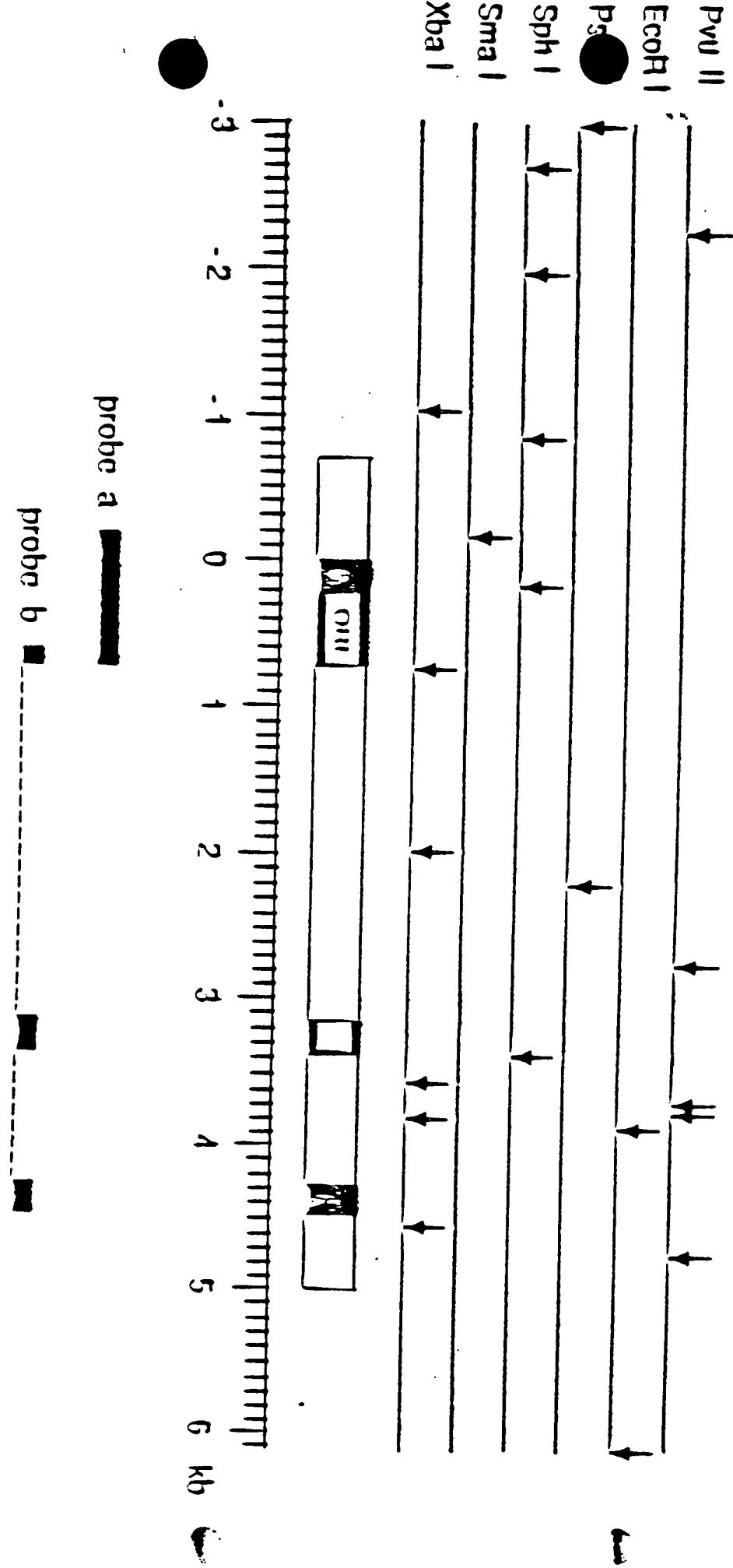


Figure 5

ACCCACAGGAG AATGAAAGAGA ACCCGGGACT CCCAAAGACG CTAGATGTGT GAAAGATCCTG ATCACTCATT	-120
GCGCTGTCTGA GTTCTGCGAT ATTCACTCCCT CAGCCCATGTA GCTTACTGTG CTCGTGGGGG GTTTGTGAGC	-50
CTTGGGTAGG AAGTTTTGCA AGTTCCGCT ACAGCTCTAG CTGTGTGATT TGTACCCCTT CACGTAAAAA	19
AGTATGTCCAG AGTTTACTAC ACCCTCCCTC CCCCCCTCCCA CCTCGTGCTG TGCTGAGTT AGAAGTCTTC	89
CTTATAGAAG TCTTCCGTAT AGAACTCTTC CGGAGGAAGG AGGGAGGACG CCCCCCCTTT GCTCTCCCAG	159
CATGCATTGT GTCAACGCCA TTGCACTGAG CTGGTCGAAG AAGTAAGCCG CTAGCTTGCG ACTCTACTCT	229
TATCTTAACG TAGCTCGGCT TCCCTGCTGGT ACCCTTTGTG CC 271	

FIGURE 6a

ATG TCT GAT AAC AAG AAA CCA GAC AAA GCC CAC AGT GGC TCA GGT GGT GAC GGT GAT GGG 59
 Met Ser Asp Asn Lys Lys Phe Asp Lys Ala His Ser Gly Ser Gly Gly Asp Gly Asp Gly
 AAT AGG TGC AAT TTA TTG CAC CGG TAC TCC CTG GAA GAA ATT CTG CCT TAT CTA GGG TGG 118
 Asn Arg Cys Asn Leu Leu His Arg Tyr Ser Leu Glu Glu Ile Leu Pro Tyr Leu Gly Trp
 CTG GTC TTC GCT GTT GTC ACA ACA AGT TTT CTG GCG CTC CAG ATG TTC ATA GAC GGC CTT 177
 Leu Val Phe Ala Val Val Thr Thr Ser Phe Leu Ala Leu Glu Met Phe Ile Asp Ala Leu
 TAT GAG GAG CAG TAT GAA AGG GAT GTG GCC TGG ATA GCC AGG CAA AGC AAG CGC ATG TCC 236
 Tyr Glu Glu Gln Tyr Glu Arg Asp Val Ala Trp Ile Ala Arg Gln Ser Lys Arg Met Ser
 TCT GTC GAT GAG GAT GAA GAC GAT GAG GAT GAG GAT GAC TAC TAC GAC GAC GAG GAC 295
 Ser Val Asp Glu Asp Asp Glu Asp Asp Asp Tyr Tyr Asp Asp Glu Asp
 GAC GAC GAC GAT GCC TTC TAT GAT GAT GAG GAT GAG GAA GAA TTG GAG AAC CTG 354
 Asp Asp Asp Ala Phe Tyr Asp Asp Glu Asp Asp Glu Glu Glu Leu Glu Asn Leu
 ATG GAT GAT GAA TCA GAA GAT GAG GCC GAA GAA GAG ATG AGC GTG GAA ATG GGT GCC GGA 413
 Met Asp Asp Glu Ser Glu Asp Glu Glu Glu Met Ser Val Glu Met Gly Ala Gly
 GCT GAG GAA ATG GGT GCT GGC GCT AAC TGT GCC TGT GTT CCT GGC CAT CAT TTA AGG AAG 472
 Ala Glu Glu Met Gly Ala Asn Cys Ala Cys Val Pro Gly His His Leu Arg Lys
 AAT GAA GTG AAG TGT AGG ATG ATT TAT TTC TTC CAC GAC CCT AAT TTC CTG GTG TCT ATA 531
 Asn Glu Val Lys Cys Arg Met Ile Tyr Phe Phe His Asp Pro Asn Phe Leu Val Ser Ile
 CCA GTG AAC CCT AAG GAA CAA ATG GAG TGT AGG TGT GAA AAT GCT GAT GAA GAG GTT GCA 590
 Pro Val Asn Pro Lys Glu Gln Met Glu Cys Arg Cys Glu Asn Ala Asp Glu Glu Val Ala
 ATG GAA GAG GAA GAA GAA GAG GAG GAG GAG GAA GAG GAA ATG GGA AAC CCG GAT 649
 Met Glu Met Gly Asn Pro Asp
 Gly Phe Ser Pro Amb

FIGURE 6b

07807043

GCATGCAGTT GCAAAGCCCA GAAGAAGAAA ATGGACAGCG GAGAGAGTGG TTGTTTTTTT 60
TCCCCCTTCA TTAATTTCTT AGTTTTAGT AAATCCAGAAA ATTTGATTTT CTTCTAAAGT 120
TCATTATGCA AAGATGTCAC CAACAGACTT CTGACTGCAT GGTGAACTTT CATATGATAAC 180
ATAGGATTAC ACTTGTAACCT GTTAAAAATA AAAGTTTGAC TTGGATAAC 228

FIGURE 6c

CDNA Sequence of Gene PIA
 Content of ASCII file : CDNA (cfr Figure 5, pages 4,5 & 6)

ACCACAGGAG AATGAAAGAA AGCGGGGACG CGCAAAAGATG CTAGATGCT
 GAAATGCGG ATCACTGAA GCGTGTGCA GTTGTGGAT ATTGATGCGG
 CAGGAAATGA GCGTACTGTT CTCGTGGGGG GTCGTGAGA TTGGGTAGG
 AAGTTTCCA AGTGGGGCT AGAGCTGATG CTTGGATTT TTGACGCTT
 CACCTAAAGA AGTATGCGA AGTTCAAGAC AGCGGGGCTG CGCGATGCCA
 CCTCGTGCTG TGTGTTTGGT AGAAGCTTC CTCATGAGG TCTGGCTAT
 AGAATCTTC CGGAGGAAGG AGGGGGAUU CGGGGGGGT GGTGGCGAG
 CAGGATGT GTCAAGGCA TGGCACTGAG CTCGGGGAGG AAGTAAGGGG
 CGAGCTTGGG AGCGGAGCTG TATTTAACT TAGGGGGCT CGCGATGTT
 AUGCTTTGTG CC
 ATG TGT GAT AAC AAG AAA CGA GAC AAA GCG TAC AGC GGC TCA
 GGT GGT GAC GGT GAT GGG AAT AGG TCC AAT CGA TTC CAC CGG
 TAC TCC CGG CAA GAA ATT CTG CGG TAT CTA GGG TGG CGG GTC
 TTC GGT GTC AGA AGA ATT TTT CTG GCG CTC CGC ATG TTC
 ATA GAC CGG CCT TAT GAG GAG CAG TAT GAA AGG GAT GTG CGG
 TGG ATA GCG AGG CAA AGG AAG CGA ATG TCC TGT GTC GAT CAG
 GAT GAA GAC GAT GAC GAT GAT GAG GAG GAC TAC TAC GAC GAC
 GAG GAC GAC GAC GAT GCG TTC TAT GAT GAT GAG GAT GAT
 GAT GAA GAA GAA TTC GAG AAC CTG ATG GAG GAT GAA TCA GAA
 GAT GAG GTC GAA GAA GAG ATG AAT GTC GAA ATG CGG CGG CGA
 GGT GTC GAA ATG GGT GGT GCG CCT AAC TGT GCG TGT GTC CCT
 GGC CAT CAT TCA AGG AAC AAT GAA GCG AAG TGT AGG ATG ATG
 TAT TTC TTC GAC GAC CCT AAC TTC CTG GTG TGT AAT CCA CCA GTG
 AAC CCT AAC GAA CAA ATG GAG TGT AGG CCT GAA AAT GGT GAT
 GAA GAG GTG GCA ATG GAA GAG CAA GAA GAA GAA GAG GAG GAG
 GAG GAG GAA GAG GAA ATG GGA AAC CCG GAT GGC CCC TCA CCT
 TAG
 GCAATGAGCTT GCGAAAGGAA GAAAGAAGAA ATGGACAGGG GAAAGAATGG
 TGTGGGGGGT TGGGATTCG TCAATGGGGT AGTGGTTAGT ATTCGGGAA
 ATTCGGGGT GTTGTAAAGT TCAATTGAGA AAGATGGGAG CAAACAGCTT
 CGAGGGCAT GGTGGGGGGT CAAATGAGC ATACGGATTAC AGCGGACCT
 CTCAAAATAA AAGTTTGGC TTGGATAC

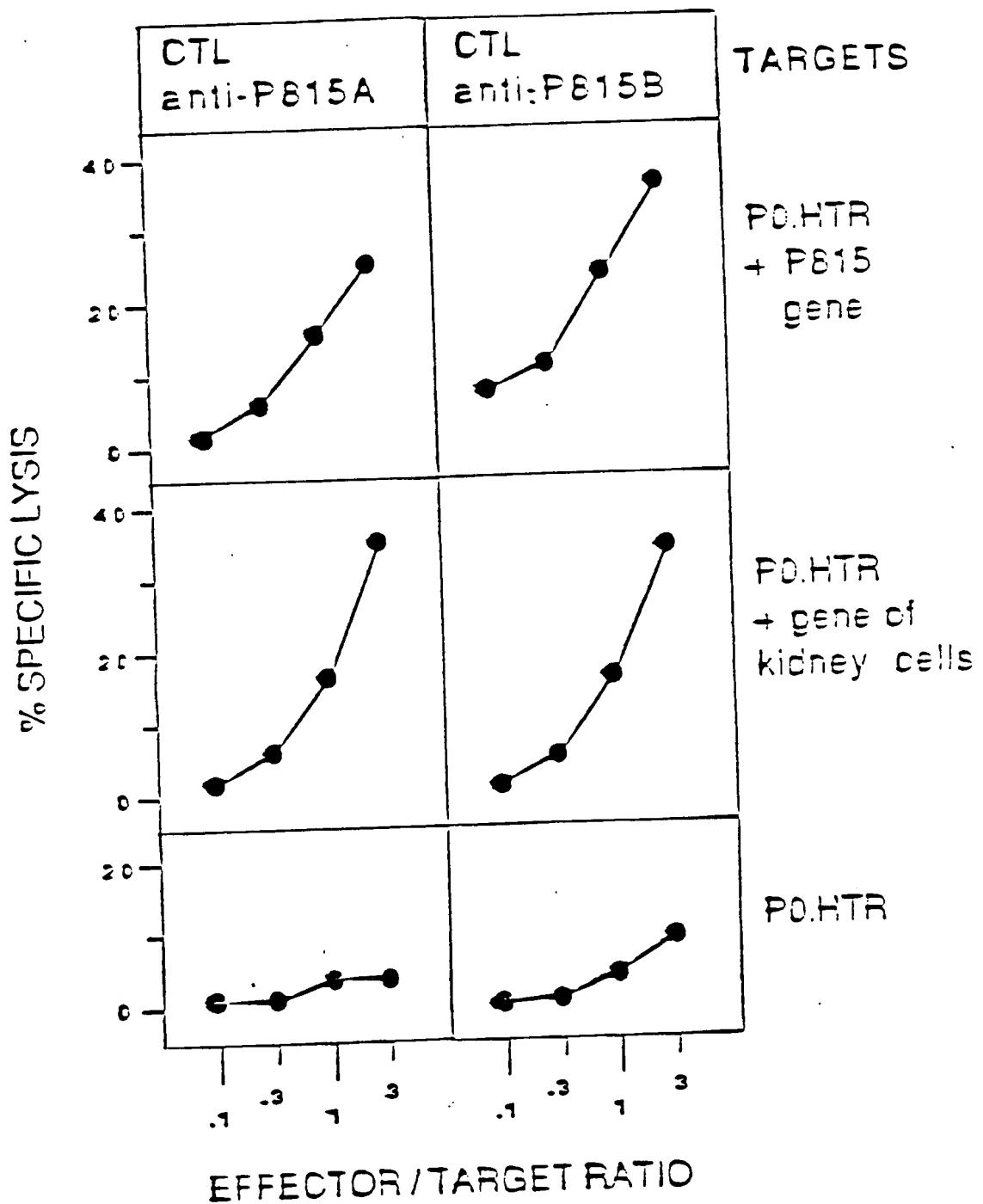


Figure 7

17/807043

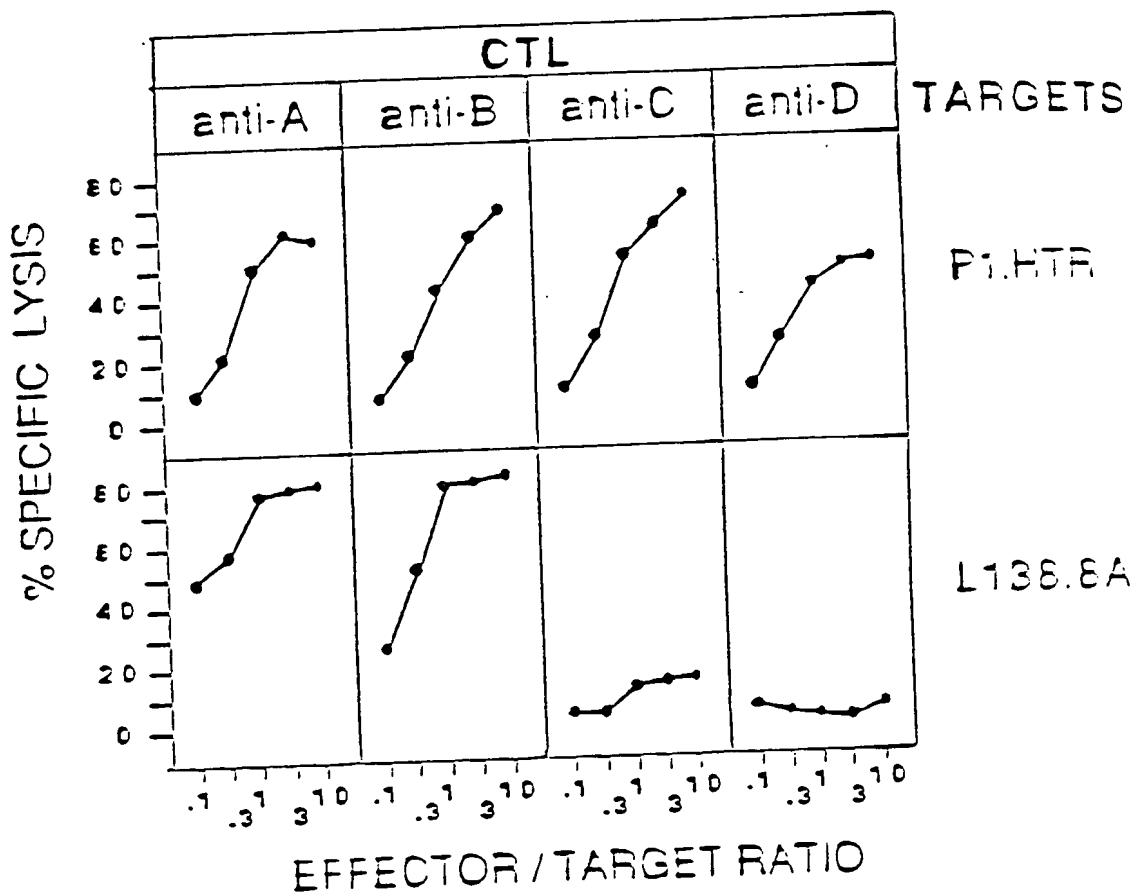


Figure 8

07807043

Genomic Sequence of gene YIA
Content of ASCII file : GENEKIC

07807043

Figure 9 (ctd)

17807043

Leu-Pro-Tyr-Leu-Gly-Trp-Leu

Figure 10

07/807043

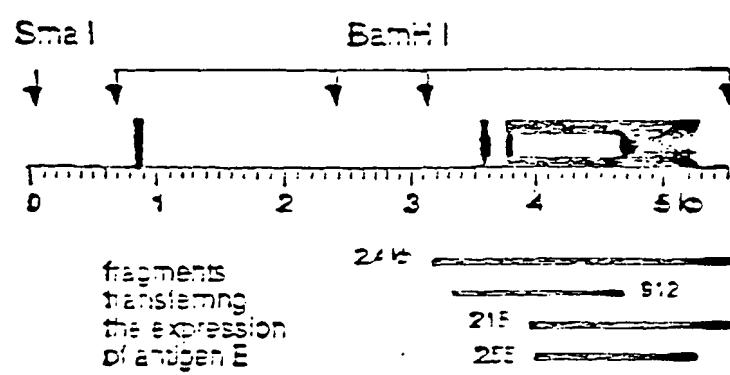


Figure 11

07807043

Figure 12

07807043

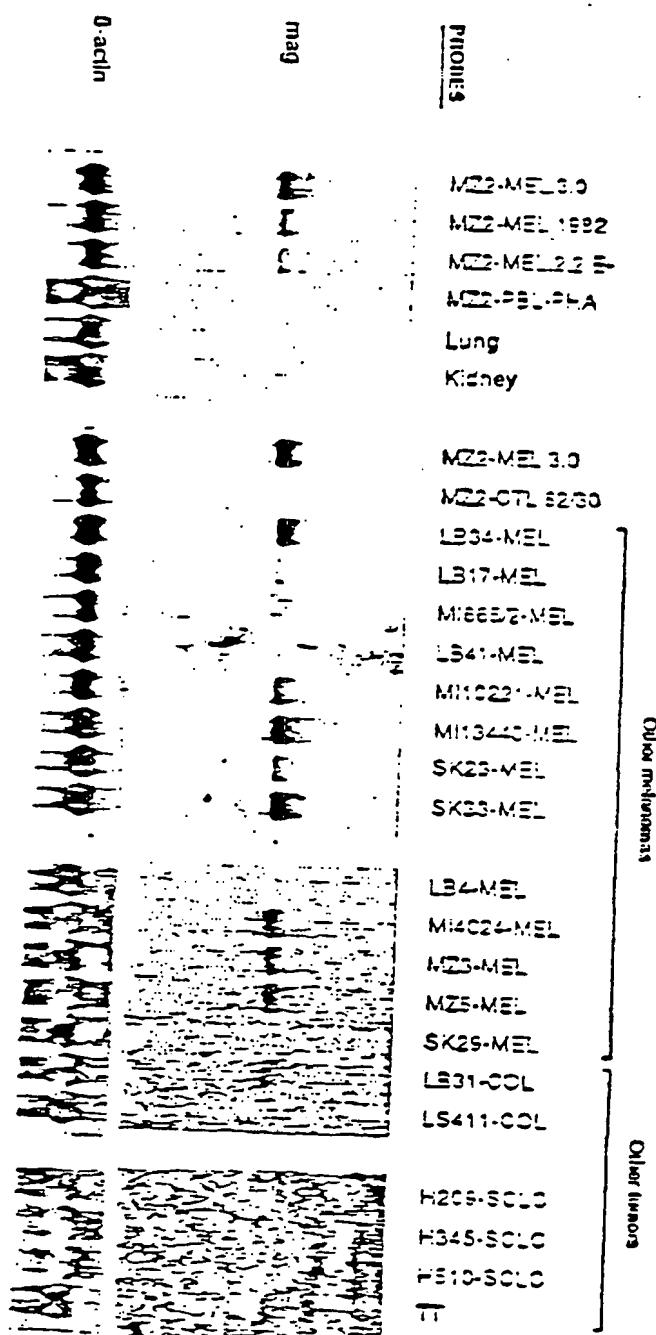


Figure 13

077807043

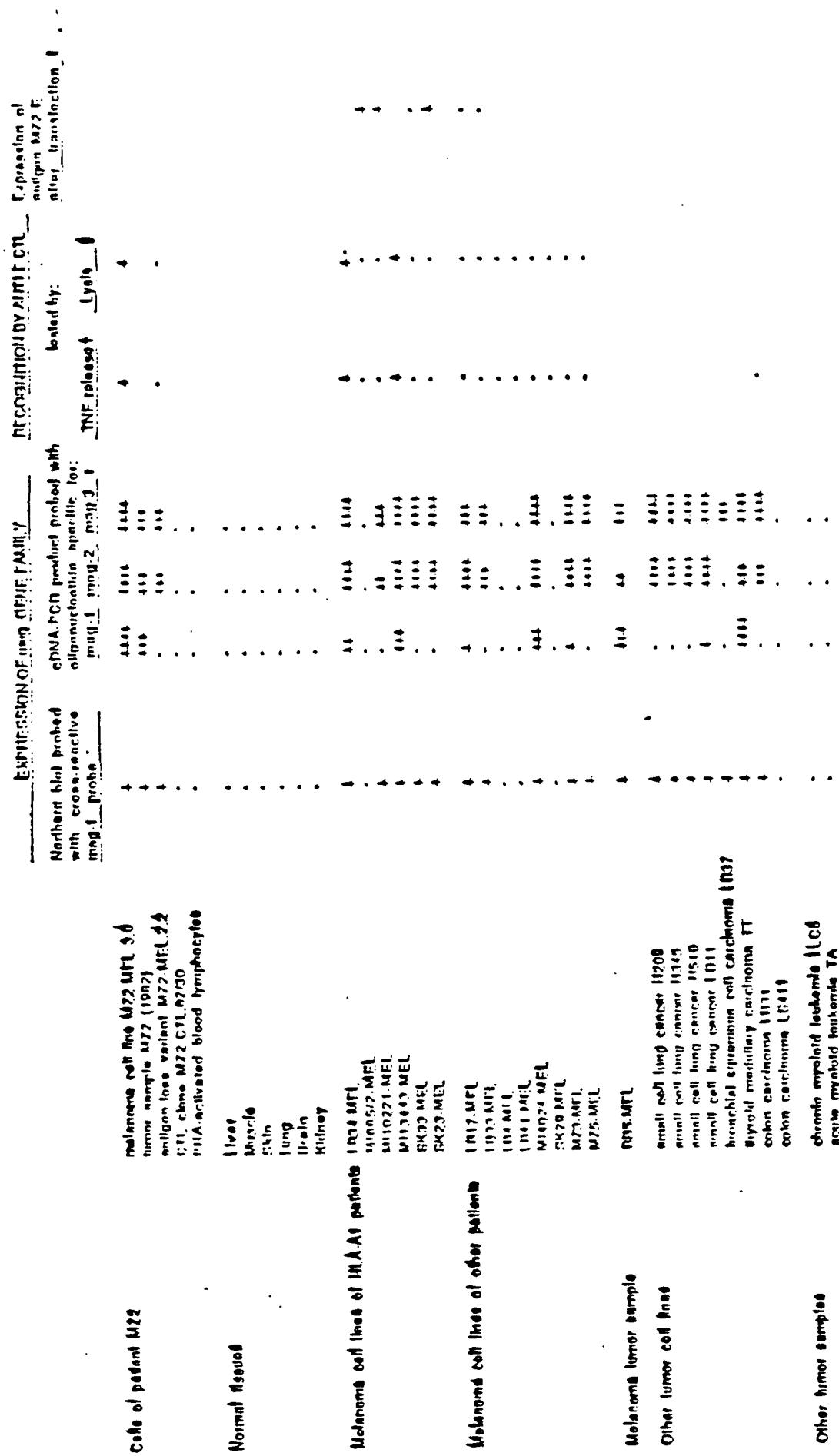


Figure 1.4

117807043

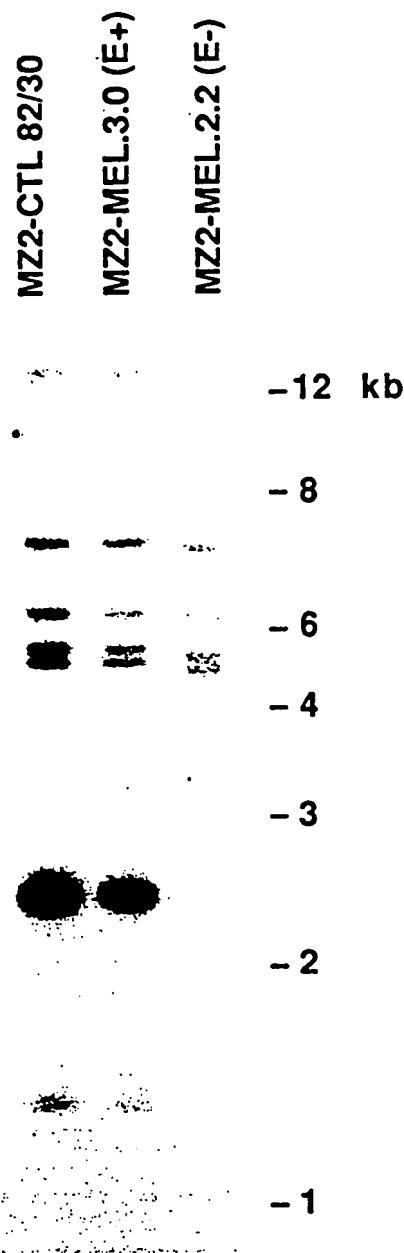


Figure 15

017807043

FAMILLE IMAGE : SCHEMA GENERAL 2001

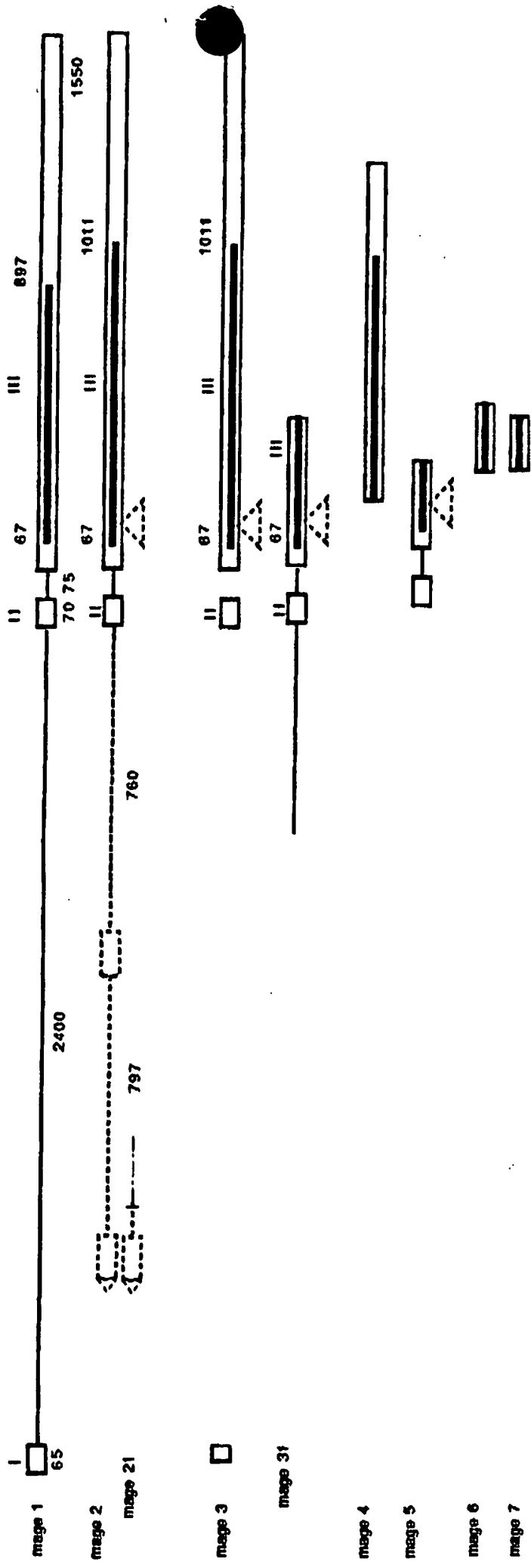


Figure 16

CCCGGGGCAG CACTGGCATC CCTCCCCCTA CCACCCCCAA TCCCTCCCC
 TACGCCACCC ATCCAAACAT CCTCACGGTC ACCCCCCAGCC CAAGCCAGGC
 AGAATCCGCT TCCACCCCTG CTCTCAACCC AGGGAAAGCC AGGCCCCCAG
 ATGTCACGCC ACTGACTTGA GCATTAGTGG TTAGAGAGAA GCGAGGTTT
 CGGTCAGGAGG GCGGGCTTGA GATCGTGGAA GCGAAGCCGG CCCAGCTCTG
 TAAGGAGGCA AGGTGACATG CTGACGGAGG ACTGAGGAAC CACTTACCC
 AGATAGAGGA CCCCAATAA TCCCTTCATG CCAGTCTCTG ACCATCTGT
 GGTGGACTTC TCAGGCTGG CCACCCCCAG CCCCCCTGTG GCTTAAACCA
 CTGGGGACTC GAAGTCAGAG CTCCGTGTGA TCAGGGAAAGG GCGCTTAGG
 AGGGGGAGC GTCCAGGCTC TGCCAGACAT CATGCTCAGG ATTCCTAAGG
 AGGGCTGAGG GTCCCTAAGA CCCCACTCCC GTGACCCAAAC CCCCCACTCCA
 ATGCTCACTC CCGTGAACCA ACCCCCTCTT CATIGTCATC CCAACCCCCA
 CCCACATCC CCCACCCCCCCTC TGATGCCAT CCGCCCCAGCC
 ATTCACCTC CACCCCCCCTC CCCACCCCCA CCCCCACTCC CACCCCCCAGC
 CAGGGAGGAT CGGGTCTCCCG CCAGGAAACA TCCGGGTGCG CGGATGTGAC
 GCCACTGACT TGCGCATTGT GGGCAGAGA GAAGCCAGGT TTCCATCTG
 AGGGACCGG TAGACTTCGG CGAAGGAAC CTGACCCAGG CTCTGTGAGG
 AGGCAACGTG AGAGGCTGAGG GGAGGACTGA GGACCCCCCC ACTCCAAATA
 GAGAGCCCCA AATATTCAGG CCCCGCCCCCTT GCTGCCAGCC CTGGCCCCACC
 CGCGGGAGA CGTCCTCAGCC TGGGCTGCCCC CCAGAACCCCT GCTCCAAAAG
 CCTTGAGAGA CACAGGTTTC TTCTCCCCAA GCTCTGGAAAT CAGAGGTTGC
 TGTGACCAAGG GCAGGACTCG TTAGGAGAGG GCGGGCACA JGCTCTGCCA
 GGCATCRAGA TCAGCACCA AGAGGGAGGG CTGTGGGCC CCAAGACTGC
 ATCTCAATCC CCACTCCCAC CCCATTGCA TCCCATCTCC CCACCCAAACC
 CCACATCTCTC CAGCTACACC TCCACCCCCCA TCCCTACTCC TACTCCGTCA
 CCIGACCAAC ACCCTCCAGC CCCASCACCA GCCCCAAACCC TTCTGCCACC
 TCACCCCTCAG TCCCCCAAC CCCACCCCTCA TCTCTCTCAT GTGGCCCCACT
 CCCATGCTCTC CCCACATCTC TGCAAGAATCC GTTTGGCCCTC TCTCTCACAC
 CCA3GGAAAG CCTGGTAGGC CGGATGIGAA ACCACTGACT TGAACTCAGC
 AGATCTGAGA GAAGCCAGGT TCATTTAATG GTTCTGAGGG GGGGCTTGAG
 ATCCACTGAG GGGAGGTTGGT TTAGGCTCTG TGAGGAGGCA AGGTGAGATG
 CTGAGGGAGG ACTGAGGGAGG CACACACCC AGGTAGATGG CCCCAAAATG
 ATTCAGTACCC ACCCTCTGCG CCASCCCTGG ACCACCCCCGG CAGGACAGAT
 GTCTCAGCTG GACCACCCCC CGTCCCCGTC CACTGCCACT TAAACCCACAG
 GGCATCTGT AGTCATAGCT TATGTGACCG GGGCAGGGTT GGTCAGGAGA
 GGCAGGGCCC AGGCATCAAG GTCCAGGATC CCCCCGGCAT TAGGCTCAGG
 ACCCTGGGAGG GGAACGTGAGG TTCCCCCACC CACACCTGTC TCTCTCACTC
 CACCGGCAAC CCACTCACCT CCCACATACCT ACCCCCTTACCC CCCAACCTCA
 TCTTGICAGA ATCCCTGCTG TCAACCCACG GAGCCACCGG GAATGGGGC
 CAGGCACTCG GATCTGACG TCCCCATCCA EGGTCTGATG GAGGGAGGG
 CCTTGACACG GGCCTCAGGG GAGCAGAGGG AGGGCCCTAC TGCGAGATGA
 GGGAGGCCTC AGAGGACCA GCACCCCTAGG ACACCGCACC CCTGCTGAG
 ACTGAGGCAG CCACTCTGG CCTCAAGAAT CAGAACGATG GGGACTCAGA
 TGGCATGGG GTGGGACCCC GGCTOCGAAG GCTTACGGCG AGGAAGAGGA
 GGGAGGACTC AGGGACCTT GGAAATCCAGA TCACTGTGAGG CCTGGCCCC
 GAGAGGTCCA GGGCACCTG CCCACATATG GCCCATATT CCTGCATCTT
 TGAGGTGACA GGACAGAGCT GTGGTCTGAG AAGTGGGGCC TCAAGTCAC
 AGAGGGAGGA GTTCCAGGAT CCATATGGCC CAGATGTC CCCCCCTCATG
 AGGACTGGGG ATATCCCCCGS CTCAAGAAAGA AGGGACTCCA CACAGTCTG
 CTGTCCCCCTT TTAGTACCTC TAGGGGAGC AGATCAEGGA TGGGGTATG
 TTCCATTCTC ACTTGTACCA CAGGCAAGG GTTGGGGGGC CCTCAGGGAG
 ATGGGGTCTT GGGGTAAAGG GGGGTGCT ACTCATGTC GGGATTTGGG
 GTTGTGAGGA GCACAGGCG TGGCAGGAAT AAAGATGAGI GAGACAGACA
 AGGCTATTGG ATATCCACCC CCAGAACCAA AGGGGTGAGC CCTGGACACC
 TCACCCACAA TGTGGTTCT TTTTCACTCC TGTTCRAGA TGTGGGGCAG
 GTGAGGACCT CAITCTCAGA GGGTCACTCA GTCAACGTA GGGACCCCCCA
 TCTGGTCTAA AGACAGAGCG GTTCCAGGAT CTGCCATGCG TICGGGTGAG
 GAAACATGAGA GGGACTGAG GGTACCCCGS GACCAGAAACA CTGAGGGAGA
 CTGCACTAGA ATAGCCCTG CCCCTGCTGT CACCCCGAGAG AGCATGGGCT
 GGGCGCTCG CCQAGGTTCT TCCGGTTATCC TGGGATCAAT CAGTCAGGG
 ACGGGGAGGC CTTGGTCTGA GAAGGGTGGC CTCAAGTCAG TAGAGGGAGC
 GTCCCCAGGCC CTGCGCAGGAG TCAAGGTGAG GACCAAGCCG GCACCTCAGC
 CAGGACACAT TAACTCAAT GAATTTGAT ATCTCTTGCT GCCCCCTCCCC
 AAGGACCTAG GCACGTGTGG CCAGATGTT GTCCTCTCTCT GTCCTCTCCAT
 TCTCTTATCAT GGATGTAAC TCTTGTATG GATTTCTCAG ACCAGCAAAA
 GGGCAGGATC CAGGCCCTGC CAGGAAATAA ATAAAGGCC TGGGTGAGAA
 CAGAGGGGGT CATCCACTGC ATGAGAGTGG GGATGTCACA GAGTCCAGCC
 CACCCCTCTG GTAGCAGTGA GAAGCCAGGG CTGTCCTTGC GGTCTGCAAC
 CTGAGGGGCC GTGGGATCTC CTTCCTGGAG CTCCAGGAAAC CAGGCAGTGA
 GGCCTTGCTC TGAGACAGTA TCTCTCAGGTC ACAGAGCAGA GGATGCAACAG
 GTGCTGCCAG CAGTGAATCT TTGCCCCGAA TGCAACCCAA GGGCCCCCAGC
 TGCCACAGGA CACATAGGAC TCCACAGAGT CTGCCCCCTAC CTCCTACTIG
 TCACTCTGT AGAATCGACC TCTGCTGGC GGTGTACCC TGAGTACCC
 CTCACTCTCT CTTTCAGGTT TTCAGGGCAC AGGCAACCC AGAGGACAGG
 ATTCCTGGA GGGCACAGAG GAGCACCAAG GAGAAGATCT GAAAGTAGGC
 CTTGTGAGA GCTCTCAGG TCTAGTCTC AGCTGAGGGCC TCTCACACAC
 TCCCTCTCTC CCCAGGGCTG TGGGCTCTCA TTGCCCCAGCT CCTGGCCCCACA
 CTCTGCTCG CTGCCCCCTAC GAGAGTCATC
 ATG TCT CTT GAG CAG AGT CTG CAC TGC AAG CCT GAG GAA

Figure 17a

CCC CTI GAG GCC CAA CAA GAG GCC CTG GGC CTG GTG TGT GAG
 CAG GCT GCC ACC TCC TCC TCC TCT CCT CTG GTC CTG GGC ACC
 CTG GAG GAG GTG CCC ACT GCT GGG TCA ACA GAT CCT CCC CAS
 ACT CCT CAG GGA CCC TCC GGC TTT CCC ACT ACC AIC AAC TTC
 ACT CGA CAG AGG CAA CCC AGT GAG GGT TCC AGC AGC CGT GAA
 GAG GAG GGG CCA AGC ACC TCT TGT ATC CTG GAG TCC TTG TTC
 CGA GCA GTC ATC ACT AAG AAG GTG GCT GAT TTS GTT GGT TTT
 CTG CTC CTC AAA TAT CGA GCC AGG GAG CCA GTC ACA AAC GCA
 GAA ATG CTG GAG AGT GTC ATC AAA AAT TAC AAG SAC TGT TTT
 CCT GAG ATC TIC GGC AAA GCC TCT GAG TCC TTG CAG CTG GTC
 TTT GGC ATT GAC GTG AAG GAA GCA GAC CCC ACC GGC CAC TCC
 TAT GTC CTI GTC ACC TGS CTA GGT CTC TCC TAT GAT GGC CTG
 CTG GGT GAT AAA CAG ATC ATG CCC AAG ACA GGC TTC CTC ATA
 ATT GTC CTG GTC ATG ATT GCA ATG GAG GGC GGC CAT GCT CCT
 GAG GAG GAA ATC TGG GAG GAG CTG AGT GTG ATG GAG GTG TAT
 GAT GGG AGG GAG CAC AGT GGC TAT GGG GAG CCC AGG AAG CTG
 CTC ACC CAA GAT TGG GTG CAG GAA AAG TAC CTG GAG TAC GGC
 AGG TCC CGG ACA GTG ATC CCG CAC GCT ATG AGT TCC TGT GGC
 GTC CAA GGG CCC TCG CTG AAA CCA GCT ATG TGA
 AAGTCCTTG ACTATGTGAT CAAGGTCACT GCAAGAGTC
 GCTTTTTCTT CCCATCCCTG CGTCAGGAG CTTTGAGAGA GGAGGGAGAG
 GGAGTCTGAG CATGAGTTGC AGCCAAGCC AGTGGGAGGG GGACTGGCC
 ATGGCACCTT CCAGGCCGCG GTCCAGCAGC TTCCCTGCC TCGTGTGACA
 TGAGGCCAT TCTTCACCTCT GAGAGAGCG GTCACTGTC TCAGTAGTAG
 GTTCTGTC TATTGGGTGA CTTGGAGATT TATCTTTGTT CTCCTTGGAA
 ATTGTTCAAA TTTTTTTTAA TAAAGGATGG TTGAATGAAAC TTCAAGCAICC
 RAGTTTAAGA ATGACAGCCAG TCAACACAGTT CTGTGATAT AGTTTAAGGG
 TAAGAGTCTT GIGTTTATT CAGATTGGGAAATCCATTCT ATTTGTGAA
 TTGGGATAAT AACACGAGTG GAATAAGTAC TTAGAAATGT GAAAAATGAG
 CAGTAATAA GATGAGATAAA AGAACTAAAG AAAATTAGAG ATAGTCATT
 CCTGCCTAT ACCTCACTT ATTCTGTAAT ATTITTAAGA ATATAAGCAT
 ACCTGGATTC CCTGGCTTC TTGAGAAATG TAAAGAAAAT TAAATGTGAA
 TAAACGATTC CCTGGCTTC CTGGCTCTT TCTTCTCCAT GCACGTGGCA
 TCTCTTTT GGAAGGCCCT GGGTTAGTAG TGGAGATGCT AAGGTAGGCC
 AGACTCATAC CCATCCATAG GGTCTGAGAG TCTAGGGAGCT GCAGTCACGT
 AATCGAGSTG GCAAGATGTC CTCIAAGAT GAGGGAAAA GTGAGAGAGG
 GGAGGGGTG TGGGGCTCCG GGTGAGAGTG GTGGAGTGTC AATGCCCTGA
 GCTGGGGCAT TTTGGGGTTT GGGAAACTGTC AGTTCCCTCT GGGGGAGCTG
 ATTGTAATGA TCTTGGGTGGATCC

Figure 17b

Gène MAGE-

CCCATCCAGA TCCCCATCCG GGCAGAAATCC GGTTCACCC TTGCGGTGAA
 CCCAGGGAGC TCAAGGGGCC GGATGTGACG CCACGTGACTT GCACATTCGA
 GSTCAGAGGA CAGCGAGATT CTGCCCCCTGA GCACCGGCCT GACGCGGGCG
 GAGGGAAAGCA GGGCGCAGGCT CCGTGAGGAG GCAAGGTAAG ACGCCGAGGG
 AGGACTGAGG CGGGCCTCAC CCCAGACAGA GGGCCCCCAA TTATCCAGC
 GCTGCCCTCG CTGCCCCGGCC TGGACCAACCC TGCAGGGGAA GACTTCTCAG
 GCTCAGICCGC CACCAACCTCA CCCCCGCCACC CCCCCGCCGCT TTAAACCCGAG
 CGAAGCTCTGG CGTAAGAGCT TIGTGTGACC AGGECAGGGC TGGTIAAGAAG
 TGCTCAGGCC CCAGACICAG CCAGGAATCA AGGTCAAGAC CCCAAGAGGG
 GACTGAGGGC AACCCACCCCT CAACCCCTCAC TACCAATCCC ATCCCCCAAC
 ACCAACCCCA CCCCCATCCCA TCAAAACACCA ACCCCACCCCG CAAACCCCAT
 TCCCACCTCC TCCCCACCCA CCATCTGGC AGATCCGGC TTGCCCCCTG
 CAAACRACCC AGCGGAAGCTC CGGGAAATGGC GGCCAAAGCAC GCGGATCTG
 ACGTTACAT GTACGGCTAA GGGAGGGAAG GGGTTGGGTC TCGTGAGTAT
 GGCCTTGGG ATGGAGAGGA AGGGCCCAGG CCTCTCTGAA GACAGTGGAG
 TCTTAAAGGG ACCCAGGATG CCAGGACAGG GGGCCCACTG TACCCCTGTC
 TCAAACTGAG CCAACCTTTC AATCAGCCGA GGGAAATCCTA CGGATGCAGA
 CCCACTTCAG GGGGTGGGG CCCAGCTTCG GAGGAGTCAA GGGGAGGAAG
 AAGAGGGAGG ACTGAGGGGA CCTTGGAGTC CAGATCAGTG GCACCTTGG
 GCTGGGGAT CCTGGGACAA GTGGCCGAAT GTGGCCCGTG CTATTCAC
 CTTCAGGGTG ACAGAGAGTT GAGGGCTGTC GTCTGAGGGC TGGGACTICA
 GGTCAGCAGA GGGAGGAATC CCAGGAATCTG CCGGACCCAA GGTGTGCC
 CTTCATGAGG ACTCCCCATA CCCCCGGCC AGAAAGAAGG GATECCACAG
 AGTCTGAAAG TAAATGTTTC TTAGCTCTGG CGGAACTGAA TCAAGGAAAG
 CCCTAAGTC CAACTCTCATI TGTACCCACAG CGAGGAGGT GGGGAACCC
 CAGGGAGATA AGGTGTGGT GTAAAGAGCA GCTGTCGCT CATTTCAGGG
 GGTTCCTCTTG TGAAGAGGG CAGTCCCTGG CAGGAGTAA GATGAGTAAAC
 CCACAGGAGG CCATCATAAC GTTCACCTTA GAACCAAAGG GGTCAAGCCT
 GGACAAAGCA CGTGGGGTAA CAGGATGTC CGGCTCTCA CTTCCTTTC
 CAGATCTCAG GGAGTTGATG ACCTTGTGTT CAGAAGTGA CTCAGTCAC
 ACAGGGCCCC CTCGGTCGA CAGAIGCAGT GCTTCAGGA TCTGCAAGC
 ATCCAGGTGG AGAGGCTGAG GTAGGATGAA GGGTACCCCT GGGCCAGAAAT
 GCAGCAAGGG GGGCCCATAG AAATCTGCC CGGCTCTGCG GTIACCTCAG
 AGACCTGGG CAGGGCTGTC AGCTGAACCT CCTCCATTAT CTGGGATCTT
 TGATGTCAGG GAAGGGGAGG CCTGGTCTG AAGGGGCTGG AGTCAGGTCA
 GTAGAGGGAG GGTCTCAGGC CCTGCCAGGA GTGGACGTGA GGACCAAAGG
 GACTCTCAGC CCAGGACACC TGGACTCCAA TGAATTGAC ATCTCTCGT
 GTCTCTCGCG GAGGACCTGG TCACGTATGG CCAGATGTCG GTCCCTCTA
 TCTCTCTCG TACCATATCA GGGAAIGTGAAT TTCTTGACAT GAGAGATTCT
 CAAGCCAGCA AAAGGGTGGG ATTACGCTC ACAAGCAGAA AGGTGAGGGC
 CCTGAGTGTGAG CACAGAGGGG ACCCTCCACG CAAAGTAGAGT GGGGACCTCA
 CGGAGTCTGG CCAACCCCTGC TGAGACITCT GGGAACTCCGT GGCCTGCTT
 CGACGCTGCA CACTGAAAGG CGGTGCAATTC CTCCTCCAGG AATCAGGAGC
 TCCAGGAAAC AGGCAETGAG GCTTGGTCT GAGTCAGTGC CTCAGGTCA
 AGAGCAGAGG GGACGCAGAC AGTGCACAAACA CTGAAGGTTE GCTGCCAATG
 CACACCAAGG GCCCCACCCG CCCAGAAACAA AGGGGACTCC AGAGGCCCC
 GGCCTACCCCT CCCTATTCTC AGTCCTGCAG CCTGAGGCATG TGCTGGGGGG
 CTGTACCCCTG AGGTGGCCCTC CCACCTTCTC CTCAGGTTG TGAGGGGGAC
 AGGCTGAAAGA GTAGGACCCCG AGGCACTGGA GGAGCAATGA AGGAGAAGAT
 CTGTAAAGTAA GCTTGTGCA GAGCCTCCAA GGTTCAGTTC AGTTCTCACC
 TAAGGCTCA CACACGCTCC TCTCTCCTCC AGGCTGTGG GTCTTCATTC
 CCCAGCTCTT GCCCCCACTC CTGCTCTGCTG CCCTGACCAAG AGTCATC
 ATG CCT CTT GAG CAG AGG AGT CAG CAC TGC AAG CCT GAA GAA
 GGC CTT GAG GCC CGA GGA GAG GCC CTG GGC CTG GTG GGT GCG
 CAG GCT CCT GCT ACT GAG GAG CAG CAG ACC GCT TCT TCC TCT
 TCT ACT CTA GTG GAA GTT ACC CTG GGG GAG CTG CCT GCT GCT GGC
 GAC TCA CCT ACT CCT CCC CAC AGT CCT CAG GGA GCC TCC AGC
 TTC TCG ACT ACC ATC AAC TAC ACT CTT TGG AGA CAA TCC GAT
 GAG GGC TCC AGC AAG GAA GAG GAG GGG CCA AGA ATG TTI
 CCC GAC CTG GAG TCC GAG TTC CAA GCA GCA ATC AGT AGG AAG
 ATG GTT GAG TTG GTT CAT TTT CTG CTC CTC AAG TAT CGA GGC
 AGG GAG CCC GTC ACA AAG GCA GAA ATG CTG GAG AGT GTC CTC
 AGA AAT TGC CAG GAC TTC TTT CCC GTG ATC TTC AGC AAA GGC
 TCC GAS TAC TTG CAG CTG GTC TTT GGC ATC GAG GTG GTG GAA
 GTG GTC CCC ATC AGC CAC TTG TAC ATC CTT GTC ACC TGC CTG
 GGC CTC TCC TAC GAT GGC CTG CTG GGC GAC AAT CAG GTC ATG
 CCC AAG ACA GGC CTC CTG ATA ATC GTC CTG GGC ATA ATC GCA
 ATA GAG GGC GAC TGT GCC CCT GAG GAG AAA ATC TGG GAG GAG
 CTG AGT ATG TTG GAG GTG TTT GAG GGG AGC GAG GAC ACT GTC

Figure 18a

07807043

Gène MAGE

TTC GCA CAT CCC AGG AAG CTG CTC ATG CAA GAT CTG GTG CAG
GAA AAC TAC CCG GAG TAC CCG CAG GTG CCC GGC ATG GAT CCT
GCA TGC TAC GAG TTC CTG TGG GGT CCA AGG GCG CTC ATT GAA
ACC AGC TAT GTG AAA GTC CTG CAC CAT ACA CTA AAG ATC GGT
GGA GAA CCT CAC ATT CCC TAC CCA CCC CTG CAT GAA CGG GCT
TTG AGA GAG GGA GAA GAG TGA
GTCTCAGCAC ATGTTGCAGC CAGGGCCAGT GGGAGGGGGT CTGGGGCGAT
GCACCTTCCA GGGCCCCATC CATTAAGCTTC CACIGCCCTCG TGTGAAATGA
GGCCCAITCC TGCCCTTTG AAGAGAGCAG TCAGCAITCT TACCGAGGAG
TTTCTGTTCT GTTGGAAIGAC TTGAGATTT ATCTTCTTT CCTTTGGAA
TTGTTCAAAT GTTCTTTTA ACAAATGTT GGATGAACTT CAGCATCCAA
GTTTATGAAT GACAGTACGC ACACATAGTG CTGTTATAT AGTTTGGGG
TAAGAGTCCT GTTTTTTATT CAGAATGGGA AATCAITCC ATTTTGTGAG
TTGTCACATA ATAACAGCAG TCGAATATGT ATTTGCTAT ATGTTGAAACG
AATTAGCAGT AAAATACATG ATACAAGGAA CCTCAAAAGAT AGTTAATCT
TGCCTTATAC CTCAGTCTAT TATGTAATAT TAAATATG TGTATGTTT
TGCTTCITG AGAATGCAAA AGAAATTAAA TCTGAATAAA TTCTTCTGT
TCACTGGCTC ATTCCTTAC CATTCACTCA GCATCTGCTC TGTGGAAAGGC
CCGGTAGTA GTGGG

Figure 18b

Gène MAGE-21

GGATCCCCAT GGATCCAGGA AGAATCCAGT TCCACCCCTG CTGTGAAACCC
ACGGAAAGTCA CGGGGGCCGGA TGTGACGCCA CTGACTTGCG CGTTGGAGGT
CAGAGAACAG CGAGAATTCTC GCCCCTGACCA ACGGCCTGAC GTCG3CGGAG
GGHAGCAGGC GCAGGGCTCCG TCAGGGAGGCA AGGTAAAGATG CGGAGGGAGC
ACTGAGCCGG GCCTCACCCC AGACAGAGGG CCCCAATAA TCCAGGGCTG
CCTCTGCTGC CAGGCCTGGA CCACCCCTGCA GGGGAAGACT TCTCAGGGCTC
AGTCGCCACC ACCTCACCCC GGCACCCCCC GGCCTTAA CGCGAGGGAA
CTCTGGTGTA AGAGCTTTGT GTGACCCAGGG CAGGGCTGGT TAGAAGTGCT
CAGGGCCCGAG ACTCAGCCAG GAATCAAGGT CAGGACCCCCA AGAGGGGACT
GAGGGTAACC CCCCCCGACCC CCCACCCACCA TTCCCATCCC CCAACACCAA
CCCCACCCCC ATCCCCAAC ACCAAACCCA CCACCCATCGC TCAAAACATCA
ACGGCACCCCC CAAACCCCGA TTCCCATCCC CACCCATCCC CGCAGAGATCG
GAGCCTTGCC CTCGCAATCA ACCCACGGAA GCTCCGGAA TGGCGGCCAA
GCACGGGGAA CC

cDNA MAGE-3 (Pvcb)

425m²
Level 3 67
GGGGCGACGGG AACCCGGCCC AGGCTCGGTG AGGAGCCAACT GTTCTGAGGG
GACASQCTGA CCTCGAGGAC CAGAAGCCCGG GCGACCCACCA CTCAGGAGA
AGATCTGCA GTGGGCTCTCC ATTCCGTCAGC TCTTGGCGAG ACTCCCGCT
GTTGCGCTCA CCAAGAATCAT C
ATG CCT CTT GAG GAC AGC AGT GAC CAC TCC AGG CCT GAA GAA
GGC CTT GAG CGG GAA GAG GCG CCT CTG GGC CTG GTG GGT GCG
CAG GCT CCT GCT ACT GAG GAG CAG GAG GCT GCG TCC TCC TCT
TCT ACT GTA GGT GAA GTC AGC CTG GCG CAG GTC CCT CCT GCG
GAG TCA CCA GAT CCT CCC CAG AGT CCT CAG GGA GCG TCC AGC
CTC CCC ACT ACC ATG AAC TAC CCT CTC TCG AGC CAA TCC TAT
GAG GAG TCG AGG AGC GAA GAA GAG GAG GCG GCA AGC AGC AGC TCC
CCT GAC CTG CGG GAG TTC CAA GCA GCA CTC AGT AGG AAG
CTG CCC CAG TCG CTT CAT TTT CTG CTC CTC AAC TAT CGA GCC
AGG GAG CGG GTC ACA AAG GCA GAA ATG CTG GGG AGT GTC GTC
GGA AAT TGG CAG TAT TTC TTT CCT GTC ATC TTC AGC AAA GCT
TCC ACT TCC TGG CAG CTG GTC TTT GCG ATC GAG CTC ATC GAA
UTG GAC CCC ATC GGC CAC TTG TAC ATC TTT GCG ACC TGC TCG
GCC CTC TCC TAC GAT GGC CTG CTG GGT GAC AAT CAG ATC ATG
CCC AAC GCA CGC CTC CTG ATA ATC GTC CTG GCG ATA ATC GCA
AGA GAG CGC GAC IGT GCT CCT GAG GAG AAA ATC TGG GAG GAG
CTG ACT GTG TTA GAG GTG TTT GAG GGG AGG GAA GAC AGT ATG
TTG GGG GAT CCC AAG AAC CTG CTC AGC CAA CAI TTC CTC CAG
GAA AAC TAC CTG GAG TAC CGG CAG GTC CCC GGC AGT GAT CCT
GCA TGT TAT GAA TTC CTG TGG GGT CCA AGG GCG CTC GTT GAA
ACC AGC TAT GTG AAA CTG GTC CAC CAT ATC GTA AAG ATC AGT
GGA GGA CCT CAC ATT TCC TAC CCA CCC CTG CAI GAG TGG GTT
TTG ACA CAC CGG CAA GAG TCA
CTCTGCGAC GAGTTGCGAC GAGGGCCAGT GGGAGGGCT CTCCCCCACT
GGACCTTCGG GGGCCCCATC CCTTACTTTC CACTGGCTCC TGTGACCTGA
GGCCGATCTT TCACTTCTTC AAGGGAGCAG TCACCATCTT TACTAGTGGG
TTTCTGTTCTT GTTGGATGAC TTGAGAGAIA TCTTTTGTCTT CCTGTTGGAC
TGTTCAAAT GTTCTTTTA ACGGATGCTT GAAAGGCGT CAGCATCCAG
CTTATCAAT GACAGTACTC ACACAGAGTG CTGTTTATAT AGTTTATGAG
TAAGAGTCTT GGTCTTACTC CAAATTGGGA AAAGGATTCG ATTTTGAGA
TGTGACATA ATTAATAGCAG TGGTAAACT ATTTGCTTA TATTGTAAGC
GATTTACCA TACATACATC CACATATCAG AGGAAATCAA ALCATAGTC
AATCTGCTT TGTACCTCA TCTATTCGTT AAAATTAAAC DAAATATGCA
ACCGAGGATTT CCTTGACTTC TTTC

Figure 20

Gène MAGE-31

GGATCCTCCA CCCCCAGTAGA CTGGGGACCT CACAGAGCTT GGGCAACCT
CCTGACAATT CTGGGAATCC GTGGCTGCGT TTGCTGTCIG CACATGGSG
GCCCGTGGAT TCCCTCICCCA GGAATCAGGA GCTCCAGGAA CAAGGCAGTG
AGGACITGGT CTGAGGCAGT GTCCCTCAAGT CACAGAGTAG AGGGGGCTCA
GATAGTGCCA ACGGTGAAGG TTGCGCTTGG ATTCAAACCA AGGGCCCCAC
CTGGCCCCAGA ACACATGGAC TCCAGAGCGC CTGGCCTCAC CCTCAATACT
TTCAGTCTG CAGCCTCAGC ATGCGCTGGC CGGATGTACC CTGAGGTGCC
CTCCTCACTTC CTCCTTCAGG TTCTGAGGGG ACAGGCTGAC CTGGAGGACC
AGAGGCCCCC GGAGGAGGAC TGAAGGAGAA GATCTGTAAG TAAGCCCTTG
TTAGAGCCCTC CAAGGTCCA TTCACTACTC AGCTGAGGTC TCTCACATGC
TCCCTCTCTC CCCAGGCCAG TGGGTCTCCA TIGCCCACCT CCTGCCACAC
CTCCCCGCTG TTGCCCCGAC CAGAGTCATC
ATG CCT CTC GAG CAG AGT CAG CAC TGC AAG CCT GAA GAA
GGC CTT GAG GCC CGA GGA GAG GCC CTG GGC CTG GTG GGT GCG
CAG GCT CCT GCT ACT GAG GAG CAG GAC GCT GCC TCC TCC TCT
TCT AGT GTA TTG GAA GTC ACC CTG GGG GAG GTG CCT GCT GCG
GAG TCA CCA GAT CCT CCC CAG AGT CCT CAG GGA GCG TCC AGC
CTC CCC ACT ACC ATG TAC TAC CCT CTC TGG AGC CAA TCC TAT
GAG GAC TCC AGC AAC CAA GAA GAG GAG GGG CCA AGC AGC TTC
CCT GAC CTG GAG TCT GAG TTC CAA GCA GCA CTC AGT AGC AAG
GTC GCG AAG TTG GTT CAT TTT CTG CTC

Figure 21

cDNA MAGE-4

GGG CCA AGC ACC TCG CCT GAC GCA GAG TCC TTG TIC CGA GAA
GCA CTC AGT AAC AAG GTG GAT GAG TTG GCT CAT TTT CTG CTC
CGC AAG TAT CGA GCC AAG GAG CTG GTC ACG AAG GCA GAA ATG
CTG GAG AGA GTC ATC AAA AAT TAC AAG CGC TGC TTT CCT GTG
ATC TTC GGC AAA GCC TCC GAG TCC CTG AAG ATG ATC TTT GGC
ATT GAC GTG AAG GAA GTG GAC CCC GCC AGC AAC ACC TAC ACC
CTT GTG ACC TGC CTG GGC CTT TCC TAT GAT GGC CTG CTG GGT
AAU AAT CAG ATC TTT CCC AAG ACA GGC CTT CTG ATA ATC GTC
CTG GGC ACA ATT GCA ATG GAG GGC GAC AGC GCC TCT GAG GAG
GAA ATC TGG GAG GAG CTG GGT GTG ATG GGG GTG TAT GAT GGG
AGG CAG CAC ACT GTC TAT GGG GAG CCC AGG AAA CTG CTC ACC
CAA GAT TGG GTG CAG GAA AAC TAC CTG GAG TAC CGG CAG GTC
CCC CGC AGT AAT CCT CGG CGC TAT GAG TTC CTG TGG GGT CCA
AGG GCT CTG GCT GAA ACC AGC TAT GTG AAA GTC CTG GAG CAT
GTC GTC AGG GTC AAT GCA AGA GTT CGC ATT GCC TAC CCA TCC
CTG CGT GAA GCA GCT TTG TTA GAG GAG GAA GAG GCA GTC TGA
GCATGAGTIG CACCCAGGGC TGTGGGAAAG GGGCAGGGCT GGGCCAGTGC
ATCTAACAGC CCTGTGCAGC AGCTTCCCTT GCCTCGTGTG ACATGAGGCC
CACTTTCAG TCTGTTGAA GAAAATAGTC AGTGTCTTA CTAGTGGGTT
TCTATTTGT TGGATGACTT GGAGATTTAT CTCTGTTTCC TTTACAAATAG
TIGRAATGTT CCTTTAATG GATGGTGGAA TTAACTTCAG CATCCAAGTT
TATGAAATCGT AGTAAACGTA TATTGCTGTT AATATAGTTT AGGAGTAAGA
GTCTTGTGTT TTATTCAGAT TGGGCCCTCC GTTCTATTIT GTGAATTG
GACATTAATAA CAGGAGTGGG AATAGTATIT AGAAGTGTGA ATTC

Gène MAGE-5

GGATCCCCAG GAGGCCCTAG AGGACCAACCA AAGGAGAAGA TCCTTAAGTA
AGCCCTTGT AGAGCCCTCCA AGCTTCAGTT TTTAGCTGAG GCTTCTCACA
TGCTCCCTCT CTCTCCAGGC CACTGGGCT CCATTGCCCA GCTCCCTGCC
ACACTCCCTGC CTGTTGCGGT GACCCAGAGTC GTC
ATG TCT CTT GAG CAG AAS ACT CAG CAC TGC AAG CCT GAG GAA
GGC CTT GAC ACC CAA GAA GAG GCC CTG GGC TGG TGG GTG TGC
AGG CTG CCA CTA CTG AGG ACG AGG AGG CTG TGT CCT CCT CCT
CTC CTC TGG TCC AGG CAC CCT

Figure 23

Gene MAGE-6

TAT TTC TTT CCT GTG ATC TTC AGC AAA GCT TCC GAT TCC TTG
CAG CTG GTC TTT GGC ATC GAG CTG ATG GAA GTC GAC CCC ATC
GGC CAC GTG TAC ATC TTT GCC ACC TGC CTG GGC CTC TCC TAC
GAT GGC CTG CCG GGT GAC AAT CAG ATC ATG CCC AGG ACA GGC
TTC CTG ATA ATC ATC CTG GCC ATA ATC GCA ASA GAG GGC GAC
TGT GCC CCT GAG GAG

17/807043

Gene MAGE-7

ACA AGC ACT AGT TTC CTG GIG ATG TAT GCC AAA GCC TCA GAG
TGC ATG CAG GTG ATG TTT GGC ATT GAC ATG AAG GAA GTG CAC
CCC GCG GCC ACT CCT ACG TCT TGT ACC TGC TTG GGC CTC TCC
TAC AAT GGC CTG CTG GGT GAT GAT CAG AGC ATG CCC GAG A

Figure 25